

CLAIMS

1. A plug valve with improved lubrication means, comprising a valve body, which forms a seat that is connected to an intake port and a discharge port, and accommodates a plug-type flow control element that controls said ports, lubrication means being further provided between said seat and said plug-type flow control element, characterized in that said lubrication means comprise at least one pair of open lubrication channels, which are provided diametrically in said plug-type flow control element, and at least one pair of open lubrication ducts, which are provided diametrically in said seat, said at least one pair of open channels being always in contact with said seat during the transfer of said plug-type flow control element from the open position to the closed position, and/or vice versa.

2. The plug valve according to claim 1, characterized in that said plug-type flow control element is substantially frustum-shaped, with a through channel having a full cross-section that substantially coincides with the passage aperture formed by said ports.

3. The plug valve according to the preceding claims, characterized in that the gauge of the connection of said valve body to the line is substantially identical to the gauge of ball valves.

4. The plug valve according to one or more of the preceding claims, characterized in that said open lubrication channels are arranged substantially along the generatrices of the surface of said plug-type flow control element.

5. The plug valve according to one or more of the preceding claims, characterized in that it comprises, on said plug-type flow control element, discontinuous lubrication channels, which are offset with respect to said open lubrication channels and are arranged so as to not affect the apertures formed by said ports during the rotation of said plug-type flow control element.

6. The plug valve according to one or more of the preceding claims,

characterized in that said discontinuous lubrication channels are arranged symmetrically with respect to said open lubrication channels.

7. The plug valve according to one or more of the preceding claims, characterized in that said open lubrication channels are arranged at said  
5 open lubrication channels when said plug-type flow control element is in the closed position.